



NASA Explorer Schools News

*A monthly newsletter
from the teachers of
tomorrow's explorers*

Sun-Earth Day will be observed on March 19th. We've included a few articles in this issue to help you mark the occasion with fun facts and activities.

Featured Mission



NASA IS STARING AT THE SUN

NASA keeps a close eye on the sun because solar activity affects our weather. Since 1996, the Solar and Heliospheric Observatory (SOHO) has been monitoring the temperature, winds and other changeable conditions on the sun from a point 1.5 million kilometers from Earth. By

staying directly between Earth and the sun, SOHO always has a clear view of our star. Instruments onboard provide information about the structure of the sun and improved our ability to predict its influence on the Earth. Despite SOHO's example, *you* should never look directly at the sun.

sohowww.nascom.nasa.gov

Activity Corner

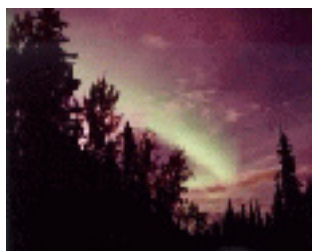
WANT TO LOOK AT THE SUN SAFELY?

With just a few pieces of thick paper and some simple instructions from the Student Observation Network, you can build a pinhole camera that will let you look at an image of the sun safely.

sunearth.gsfc.nasa.gov/sunobserve1.pdf

This network helps students study the interaction between the sun and the Earth. Learn more on how to safely observe the sun, make solar predictions, make use of real NASA data, examine how an aurora is created and share observations with the rest of the world.

Bytes and Bits



What are the Northern Lights?

Also called the *Aurora Borealis*, this cosmic lightshow is caused by solar winds interacting with the Earth's magnetic field. Under the right conditions, this process can make glowing bands of colored light in the night sky. Auroras are usually only seen in the far north or south of the planet.

Question of the month: What is the scientific name for the *Southern Lights*? The first 10 students to send the correct answer to NESNews@nasa.gov will receive a NASA poster! Make sure to include your first and last name, your teacher's name and the full name of your school.

NASA Explorers are people like you

Name: Berta Alfonso

Job: Educational Technology Project Manager

Education: B.S. in Electrical Engineering with Computer Option, enrolled in M.S. program in System Engineering and Management



Berta Alfonso designs software and hardware for the Space Program. Her family moved from Cuba to the U.S. when she was six before she could speak English. She particularly enjoyed math because it "...was a subject I didn't need English to understand." Though she learned English by second grade, Berta never lost her love of math and went on to study engineering and computers. Berta's parents encouraged her to go to college, saying "material things can be taken away, but knowledge will always be yours." Berta started out developing projects for the Shuttle and the Space Station at NASA Kennedy Space Center. She has since moved on to working on educational technology tools. Her current projects include *Virtual Lab* for high school and *Enter the Firing Room* for middle school. When she's not working, Berta enjoys vacationing with her family, exploring "new sites and cultures."

NES Spotlight

Sioux Central Middle School (www.sioux-central.k12.ia.us)

Students: 543 **Teaching staff:** 56

Sioux Central Middle School, where are you? This rural school district is surrounded by fields of corn and soybean just one mile south of Sioux Rapids, IA. The middle school is part of a facility that opened in 1996. This all-in-wonder school is one building that hosts three schools broken up by "pods." Each has its own community area with lockers and facilities. Technology is not lacking at *this* school: capabilities include two-way audio and video, four computer labs and classrooms wired for the Internet. Teachers use this technology to communicate with staff, students and their families. Every three years the school hosts an Academic Fair for the entire school district. Sioux Central Middle School, we see you are doing great things!

Teacher Tech Talk Tuesday

Get your technology questions answered live on the Internet. On the first and third Tuesday of each month IT expert Shane Keating will answer your questions and give you helpful tips. Send your questions to NESNews@nasa.gov.

February 17: *Computer Viruses*

March 2: *Effective Presentations*



National Aeronautics and
Space Administration

Please send comments or questions to NESNews@nasa.gov
learners.gsfc.nasa.gov/ExplorerSchoolsNews